

IN THE CLAIMS:

Please cancel claims 23 – 40 without prejudice or disclaimer of the subject matter thereof and add new claims as follows.

1 --1 (Withdrawn). A temperature sensing device for measuring temperature of a fluid
2 at various locations along an intravenous fluid line extending between a fluid source and a
3 patient, said device comprising:

4 a housing member selectively securable to said fluid line at any of a plurality of fluid line
5 locations between said fluid source and said patient, wherein said housing member includes a
6 receptacle to receive and retain a portion of said fluid line corresponding to one of said plurality
7 of fluid line locations selected by an operator and to allow said fluid line to extend continuously
8 through said housing member, and wherein said plurality of fluid line locations includes at least
9 one proximal fluid line location toward said fluid source and at least one distal fluid line
10 location toward said patient; and

11 a temperature sensor disposed proximate said receptacle to measure temperature of fluid
12 within said retained fluid line portion and to generate a temperature signal indicating said
13 measured fluid temperature to facilitate display of said measured fluid temperature.

1 2 (Withdrawn). The sensing device of claim 1 further comprising:

2 a temperature monitor in communication with said temperature sensor to receive said
3 temperature signal and display said fluid temperature measured by said temperature sensor.

1 3 (Withdrawn). The temperature sensing device of claim 2, wherein said

2 temperature monitor includes a hand-held display device.

1 4 (Withdrawn). The temperature sensing device of claim 1, wherein said housing
2 member is slidable along said fluid line upon receiving and retaining said selected fluid line
3 portion to allow fluid temperature measurements at any of said plurality of fluid line locations.

1 5 (Withdrawn). The temperature sensing device of claim 1 further comprising:
2 a cover member connected and movable with respect to said housing member to control
3 access to said receptacle.

1 6 (Withdrawn). The temperature sensing device of claim 1, wherein said receptacle
2 includes a channel with a sensor receiving area that secures said temperature sensor within said
3 housing member and a tapered section configured to releasably engage said selected fluid line
4 portion received within said receptacle.

1 7 (Withdrawn). The temperature sensing device of claim 1 further comprising:
2 a plurality of resilient prongs extending from said housing member and configured to
3 receive and releasably retain said temperature sensor proximate said receptacle.

1 8 (Withdrawn). The temperature sensing device of claim 7, wherein each of said
2 prongs includes a transversely extending projection, each projection extending a selected
3 distance toward the other projection to engage and releasably retain said temperature sensor
4 between said prongs.

1 9 (Withdrawn). The temperature sensing device of claim 1, wherein said housing
2 member further includes a platform including an engaging surface to engage a body part of said
3 patient.

1 10 (Withdrawn). The temperature sensing device of claim 1, wherein said
2 temperature sensor includes a sensing tip disposed within said receptacle to pierce a wall of said
3 selected fluid line portion and directly measure temperature of fluid flowing through that portion.

1 11 (Withdrawn). The temperature sensing device of claim 10, wherein said housing
2 member further includes an upper member pivotally connected to a lower member, each of said
3 upper and lower members includes a groove disposed on an engaging surface, and said grooves
4 of said upper and lower members are aligned on said engaging surfaces to form said receptacle in
5 the form of a channel upon contact between said engaging surfaces.

1 12 (Withdrawn). The temperature sensing device of claim 11, wherein said engaging
2 surfaces include a locking mechanism to lock said upper member against said lower member.

1 13 (Withdrawn). The temperature sensing device of claim 1, wherein said housing
2 member includes a resilient member arranged in a spiral configuration with first and second
3 resilient member ends overlapping each other and separated by a gap.

1 14 (Original). A temperature sensing device for measuring temperature of a fluid flowing

2 within an intravenous fluid line at selected locations along said fluid line, said device
3 comprising:

4 a fitting including:

5 first and second open ends each securable to selected portions of said fluid line;

6 a passage disposed within said fitting and extending between said first and second open
7 ends to permit fluid flowing within said fluid line to flow through said fitting; and

8 a connection port disposed on an exterior surface of said fitting and in fluid
9 communication with said passage; and

10 a temperature sensor disposed within said connection port to measure temperature
11 of fluid flowing through said fitting and to generate a temperature signal indicating said
12 measured fluid temperature to facilitate electronic display of said measured fluid temperature.

1 15 (Original). The sensing device of claim 14 further comprising:

2 a temperature monitor in communication with said temperature sensor to receive said
3 temperature signal and electronically display said fluid temperature measured by said
4 temperature sensor.

1 16 (Original). The temperature sensing device of claim 15, wherein said temperature
2 monitor includes a hand-held display device.

1 17 (Withdrawn). The temperature sensing device of claim 14, wherein said
2 temperature sensor directly contacts fluid flowing within said passage.

1 18 (Original). The temperature sensing device of claim 14 further comprising:

2 a receptacle disposed within said connection port to directly contact fluid flowing within
3 said passage, wherein said temperature sensor is removably received within and contacts said
4 receptacle.

1 19 (Original). The temperature sensing device of claim 18, wherein said connection port
2 extends from an outer surface of said fitting and said device further comprises:

3 a securing member to secure said temperature sensor to said connection port, wherein
4 said securing member includes a recess defined therein and said temperature sensor is disposed
5 within said recess and extends to contact said receptacle when said securing member is secured
6 to said connection port.

1 20 (Withdrawn). The temperature sensing device of claim 19, wherein said securing
2 member and said connection port include a locking mechanism to releasably secure said securing
3 member to said connection port and to facilitate contact between said temperature sensor and
4 said receptacle.

1 21 (Withdrawn). The temperature sensing device of claim 20, wherein said locking
2 mechanism includes:

3 at least one projection removably attached to an outer surface of said connection port; and
4 at least one engagement member disposed on said securing member to engage a
5 corresponding projection;

6 wherein said at least one engagement member is configured to remove said

7 corresponding projection from said connection port in response to disengagement of said
8 securing member with said connection port to thereby prevent re-engagement of said connection
9 port with said securing member and re-use of said fitting.

1 22 (Withdrawn). The temperature sensing device of claim 14, wherein said
2 connection port includes a flexible membrane to seal an opening in said connection port from
3 said passage, and said temperature sensor includes a sensing tip configured to penetrate said
4 flexible membrane and directly measure temperature of fluid flowing within said passage.

1 23 - 40 (Canceled).

1 41 (Withdrawn). A temperature sensing device for measuring temperature of a fluid
2 at various locations along an intravenous fluid line extending between a fluid source and a
3 patient, said device comprising:

4 housing means for engaging said fluid line and selectively securable to said fluid line at
5 any of a plurality of fluid line locations between said fluid source and said patient, wherein said
6 housing means includes receiving means for receiving and retaining a portion of said fluid line
7 corresponding to one of said plurality of fluid line locations selected by an operator and for
8 allowing said fluid line to extend continuously through said housing means, and wherein said
9 plurality of fluid line locations includes at least one proximal fluid line location toward said fluid
10 source and at least one distal fluid line location toward said patient; and

11 temperature sensing means disposed proximate said receiving means for measuring
12 temperature of fluid within said retained fluid line portion and generating a temperature signal

13 indicating said measured fluid temperature to facilitate display of said measured fluid
14 temperature.

1 42 (Withdrawn). The temperature sensing device of claim 41 further comprising:
2 display means in communication with said temperature sensing means for receiving said
3 temperature signal and displaying said fluid temperature measured by said temperature sensing
4 means.

1 43 (Withdrawn). The temperature sensing device of claim 41, wherein said housing
2 means is slidable along said fluid line upon receiving and retaining said selected fluid line
3 portion to allow fluid temperature measurements at any of said plurality of fluid line locations.

1 44 (Withdrawn). The temperature sensing device of claim 41 further comprising:
2 cover means connected and movable with respect to said housing means for controlling
3 access to said receiving means.

1 45 (Withdrawn). The temperature sensing device of claim 41, wherein said device
2 further comprises:
3 resilient means extending from said housing means for receiving and releasably retaining
4 said temperature sensing means proximate said receiving means.

1 46 (Withdrawn). The temperature sensing device of claim 41, wherein said housing
2 means further includes patient means for engaging a body part of said patient.

1 47 (Withdrawn). The temperature sensing device of claim 41, wherein said
2 temperature sensing means includes line sensing means disposed within said receiving means for
3 piercing a wall of said selected fluid line portion and directly measuring temperature of fluid
4 flowing through that portion.

1 48 (Withdrawn). The temperature sensing device of claim 47, wherein said housing
2 means further includes an upper member pivotally connected to a lower member, each of said
3 upper and lower members includes a groove disposed on an engaging surface, and said grooves
4 of said upper and lower members are aligned on said engaging surfaces to form said receiving
5 means in the form of a channel upon contact between said engaging surfaces.

1 49 (Withdrawn). The temperature sensing device of claim 48, wherein said engaging
2 surfaces include locking means for locking said upper member against said lower member.

1 50 (Withdrawn). The temperature sensing device of claim 41, wherein said housing
2 means includes a resilient member arranged in a spiral configuration with first and second
3 resilient member ends overlapping each other and separated by a gap.

1 51 (Original). A temperature sensing device for measuring temperature of a fluid flowing
2 within an intravenous fluid line at selected locations along said fluid line, said device
3 comprising:

4 connector means for permitting fluid flow therethrough, said connector means including:

5 first and second open ends each securable to selected portions of said fluid line;

6 flow means disposed within said connector means and extending between said first and
7 second open ends for permitting fluid flowing within said fluid line to flow through said
8 connector means; and

9 fluid access means disposed on an exterior surface of said connector means and in
10 fluid communication with said flow means; and

11 temperature sensing means disposed within said fluid access means for measuring
12 temperature of fluid flowing through said connector means and for generating a temperature
13 signal indicating said measured fluid temperature to facilitate electronic display of said measured
14 fluid temperature.

1 52 (Original). The temperature sensing device of claim 51 further comprising:

2 display means in communication with said temperature sensing means for receiving said
3 temperature signal and electronically displaying said fluid temperature measured by said
4 temperature sensing means.

1 53 (Withdrawn). The temperature sensing device of claim 51, wherein said

2 temperature sensing means directly contacts fluid flowing within said flow means.

1 54 (Original). The temperature sensing device of claim 51 further comprising:

2 cover means disposed within said fluid access means to directly contact fluid flowing
3 within said flow means, wherein said temperature sensing means is removably received within
4 and contacts said cover means.

1 55 (Original). The temperature sensing device of claim 54, wherein said fluid access
2 means extends from an outer surface of said connector means and said device further comprises:
3 securing means for securing said temperature sensing means to said fluid access means,
4 wherein said securing means includes a recess defined therein and said temperature sensing
5 means is disposed within said recess and extends to contact said cover means when said securing
6 means is secured to said fluid access means.

1 56 (Withdrawn). The temperature sensing device of claim 55, wherein said securing
2 means and said fluid access means include locking means for releasably securing said securing
3 means to said fluid access means and for facilitating contact between said temperature sensing
4 means and said cover means.

1 57 (Withdrawn). The temperature sensing device of claim 56, wherein said locking
2 means includes:
3 projection means removably attached to an outer surface of said fluid access means for
4 securing said securing means to said fluid access means; and
5 engagement means disposed on said securing means for engaging a corresponding
6 projection means for securing said securing means to said fluid access means;
7 wherein said engagement means removes said corresponding projection from said fluid
8 access means in response to disengagement of said securing means with said fluid access means
9 to thereby prevent re-engagement of said fluid access means with said securing means and re-use
10 of said connector means.

1 58 (Withdrawn). The temperature sensing device of claim 51, wherein said fluid
2 access means includes barrier means for sealing an opening in said fluid access means from said
3 flow means, and said temperature sensing means includes penetrating sensing means for
4 penetrating said barrier means and directly measuring temperature of fluid flowing within said
5 flow means.

1 59 (New). The temperature sensing device of claim 14 further comprising:
2 a temperature monitor in communication with said temperature sensor to receive said
3 temperature signal and print said measured fluid temperature.

1 60 (New). The temperature sensing device of claim 14 further comprising:
2 a temperature monitor in communication with said temperature sensor to receive said
3 temperature signal and record measured temperatures of said fluid.

1 61 (New). The temperature sensing device of claim 60, wherein said temperature
2 monitor includes a printer to print said recorded measured fluid temperatures.

1 62 (New). The temperature sensing device of claim 51 further comprising:
2 temperature printing means in communication with said temperature sensing means for
3 receiving said temperature signal and printing said measured fluid temperature.

1 63 (New). The temperature sensing device of claim 51 further comprising:

2 temperature monitoring means in communication with said temperature sensing means
3 for receiving said temperature signal and recording measured temperatures of said fluid.

1 64 (New). The temperature sensing device of claim 63, wherein said temperature
2 monitoring means includes printing means for printing said recorded measured fluid
3 temperatures.--